REMARKS

This request for reconsideration is filed in response to the final Office Action dated November 10, 2009. For the following reasons this application should be allowed and the case passed to issue.

Claims 1-25 are pending in this application. Claims 18-25 are withdrawn pursuant to a restriction requirement. Claims 1-17 were rejected.

Claim Rejections Under 35 U.S.C. § 102

Claims 1-17 were rejected under 35 U.S.C. § 102(b) as being anticipated by Chizawa et al. (EP 1030396). This rejection is traversed, and reconsideration and withdrawal thereof respectfully requested. The following is a comparison between the present invention, as claimed, and the cited prior art.

An aspect of the present invention, per claim 1, is a polymer electrolyte fuel cell comprising a membrane electrode assembly comprising a polymer film and a pair of electrodes formed on both surfaces of the polymer film. A downstream gas supply channel faces a specific electrode of the pair of the electrodes. An upstream gas supply channel which supplies a reaction gas to the downstream gas supply channel is not facing the specific electrode. A partition wall which is made from a porous material, is arranged substantially parallel to the polymer film and partitions the downstream gas supply channel and the upstream gas supply channel.

Chizawa et al. do not anticipate the claimed polymer electrolyte fuel cell because Chizawa et al. do not disclose a downstream gas supply channel faces a specific electrode of the pair of the electrodes, an upstream gas supply channel which supplies a reaction gas to the downstream gas supply channel is not facing the specific electrode, and a partition wall which is

made from a porous material, is arranged substantially parallel to the polymer film, as required by claim 1.

Chizawa et al. disclose reacted gas groves 12a, 12b, unreacted gas grooves 11a, 11b, and a porous body 14 interposed between the reacted gas grooves 12a, 12b and the unreacted gas grooves 11a, 11b in the temperature/humidity exchange portion 10 (see Fig. 2A). However, the reacted gas grooves 12a, 12b do not correspond to the downstream gas supply channel of claim 1, the unreacted gas grooves 11a, 11b do not correspond to the upstream gas supply channel of claim 1, and the porous body 14 does not correspond to the partition wall of claim 1. The reacted gas grooves 12a, 12b, unreacted gas grooves 11a, 11b, and the porous body 14 are provided in the temperature/humidity exchange portion 10 of Chizawa et al., which is outside the fuel cell stack 6, and hence the temperature/humidity exchange portion 10 is not a component of the polymer electrolyte fuel cell 4 as in the present invention.

Because the porous body 14 is a part of the temperature/humidity exchange portion 10, which is provided outside the fuel cell stack 6, the Office can not assert that the porous body 14 is arranged substantially parallel to the polymer film as required by claim 1 of the present invention. Further, because the reacted gas grooves 12a, 12b are formed in the temperature/humidity exchange portion 10, it is physically impossible to make the reacted gas grooves 12a, 12b face a specific electrode of the pair of the electrodes of the membrane electrode assembly, which is a part of the fuel cell 4 stacked into the fuel cell stack 6.

Figs. 11-16 of Chizawa et al. show various constructions of a fuel cell 4 in which air flow and water vapor flow are indicated. However, the downstream gas supply channel, upstream gas supply channel, and partition wall, as required by claim 1, are not shown in Chizawa et al.

The Final Office Action states: "the temperature/humidity exchange portion 10 of

Chizawa et al. is "integrated" into the fuel cell stack (0044), and in Fig. 2A, the temperature/humidity exchange portion 10 is shown as disposed away from the cell stack 9 for convenience of explanation (0043)." The Office Action thereby concluded that the temperature/humidity exchange portion 10 is not "outside" of the stack.

The Office Action's conclusions are traversed. After the cited statement "Fig. 2A, the temperature/humidity exchange portion 10 is shown as disposed away from the cell stack 9 for convenience of explanation", Chizawa et al. state "As a matter of fact however, in this embodiment, the temperature/humidity exchange portion 10 is actually disposed to contact with the cell stack 9." Chizawa et al. further state in para. 0044, "the temperature/humidity exchange portion 10 is disposed to contact with the cell stack 9, thus integrating the temperature/humidity exchange portion 10 with the cell stack 9."

The above disclosure of Chizawa et al. shows that the temperature/humidity exchange portion 10 and the cell stack 9 are separate features. The term "integrated" herein denotes that the separate features are in contact with each other, but does not mean that the temperature/humidity exchange portion 10 is disposed in the cell stack 9. It is clear that the temperature/humidity exchange portion 10 is structurally disposed on the outside of the cell stack 9, or in other words, they are provided as separate bodies which are physically in contact with each other.

In view of the above arguments, it is clear that the reacted gas grooves 12a, 12b of Chizawa et al. do not correspond to the downstream gas supply channel defined in Claim 1, the unreacted gas grooves 11a, 11b of Chizawa et al. do not correspond to the upstream gas supply channel defined in Claim 1, and the porous body 14 of Chizawa et al. do not correspond to the partition wall defined in Claim 1.

It appears the Examiner has not fully considered the configuration required by the present claims and instead has focused on the Chizawa et al. teaching that the temperature/humidity exchange portion 10 is integrated into the cell stack 9, without considering what the final structure of such an integrated device would be. It is clear that the "integrated" device according to Chizawa et. al. is quite unlike the claimed structure.

The factual determination of lack of novelty under 35 U.S.C. § 102 requires the disclosure in a single reference of each element of a claimed invention. *Helifix Ltd. v. Blok-Lok Ltd.*, 208 F.3d 1339, 54 USPQ2d 1299 (Fed. Cir. 2000); *Electro Medical Systems S.A. v. Cooper Life Sciences, Inc.*, 34 F.3d 1048, 32 USPQ2d 1017 (Fed. Cir. 1994); *Hoover Group, Inc. v. Custom Metalcraft, Inc.*, 66 F.3d 399, 36 USPQ2d 1101 (Fed. Cir. 1995); *Minnesota Mining & Manufacturing Co. v. Johnson & Johnson Orthopaedics, Inc.*, 976 F.2d 1559, 24 USPQ2d 1321 (Fed. Cir. 1992); *Verdegaal Bros. v. Union Oil Co. of California*, 814 F.2d 628, 631, 2 USPQ2d 1051 (Fed. Cir. 1987). Because Chizawa et al. do not disclose a downstream gas supply channel faces a specific electrode of the pair of the electrodes, an upstream gas supply channel which supplies a reaction gas to the downstream gas supply channel is not facing the specific electrode, and a partition wall which is made from a porous material, is arranged substantially parallel to the polymer film, as required by claim 1, Chizawa et al. do not anticipate claim 1.

Applicant further submits that Chizawa et al. do not suggest the claimed polymer electrolyte fuel cell.

The dependent claims are allowable for at least the same reasons as claim 1, and further distinguish the claimed polymer electrolyte fuel cell.

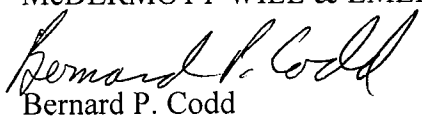
In view of the above remarks, Applicant submits that this application should be allowed and the case passed to issue. If there are any questions regarding this response or the application

in general, a telephone call to the undersigned would be appreciated to expedite the prosecution of the application.

To the extent necessary, a petition for an extension of time under 37 C.F.R. § 1.136 is hereby made. Please charge any shortage in fees due in connection with the filing of this paper, including extension of time fees, to Deposit Account 500417 and please credit any excess fees to such deposit account.

Respectfully submitted,

McDERMOTT WILL & EMERY LLP



Bernard P. Codd
Registration No. 46,429

Please recognize our Customer No. 20277 as our correspondence address.

600 13th Street, N.W.
Washington, DC 20005-3096
Phone: 202.756.8000 BPC:MWE
Facsimile: 202.756.8087
Date: February 9, 2010